REMARKS

The present application contains claims 25 to 43.

35 USC 102 (b) Rejections

The Examiner has rejected claims 25-36, and 38-43 under 35 USC 102 (b) as being anticipated by US Patent 6,091,954 to Haartsen et al., hereinafter referred to as Haartsen.

Applicant respectfully traverses the Examiner's rejections.

Claims 25, 35 and 43

The present invention claims method and apparatus which identifies available resources at a plurality of channel element modules (CEM) in a base station; pre-allocates the available resources into a plurality of supplementary channels at a channel resource pool module (CRP) in the base station; receives a request for an additional bandwidth at the CRP; and matches the request with a member of the plurality of the supplementary channels pre-allocated at the CRP, resulting in the supplementary channel; and assigns the supplementary channel to the request.

This approach solves the two problems in prior art design, as described at page 2, lines 24 to 27 of the present application, namely the wait until the service is needed, and the slow off board exchanges in order to locate the required capacity. By pre-allocating the available resources into a plurality of supplementary channels at a channel resource pool module (CRP) in the base station, the present invention does "as much of the work as possible before the resources are actually needed", and "after the service is needed, use a higher speed connection to execute the work" (page 2, lines 3 to 6); leading to "shorter apparent call 'set-up' time" (page 2, line 10).

Rather than buffering and scheduling calls, and scheduling calls, the present invention pre-configures, pre-classifies, and pre-allocates otherwise idle resources to fulfill random calls for data service, resulting in a shorter actual delay between the demand for and the supply of those resources. (page 2, lines 27 to 30).

In contrast, the problem to be solved by Haartsen is to balance the frequency reuse plan between enhanced and non-enhanced mobile units in a cellular communication system (col. 1, lines 19-61), in other words, Haartsen is concerned with a minimum link quality requirement for a call in the context of frequency reuse plan. This problem is non-analogous to the problem of achieving "shorter apparent call 'set-up' time" (page 2, line 10), to accommodate the "data-burst" as described, for example, in Abstract, at page 1, line 13, and page 3, line 23 of the present application.

In addition, and because Haartsen is only concerned about the frequency reuse plan between enhanced and non-enhanced mobile units, Haartsen teaches a plurality of transceivers for a base station, with each receiver having its own transceiver detection characteristics, and being associated with a different fixed reuse plan and own set of pre-allocated channels. In other words, the channels are pre-allocated to the individual transceivers based on the transceiver detection characteristics. (column 5, line 55 to column 6, line 9).

In Figure 2, Haartsen describes a base station with subsystems, each subsystem is associated with a particular transceiver (column 6, line 50). The base station has further a pool of pre-allocated channels, the pool is divided into a number of sets, and each set corresponds to a particular frequency reuse level. (column 7, lines 19-20). It should be apparent to a person skilled in the art that Haartsen does not teach "pre-allocating the available resources into a plurality of supplementary channels at a channel resource pool module (CRP) in the base station".

Haartsen discusses at column 6, lines 10-45, the selection of base station, base station transceiver, and corresponding channel based on mobile unit type and base station receiver detection capabilities for providing different bit rate services. (column 6, lines 13-19). Haartsen at column 6, lines 10-45 does not teach or suggest "receiving a request for an additional bandwidth".

Applicant further notes that the dependent claims are at least novel in view of Haartsen by virtue of their dependencies. For the completeness of the remarks, Applicant provides following comments.

Claims 26, 27, 32 and 38

Haartsen discusses at column 3, lines 40-53, and in Figure 2 "assigning a channel, associated with one of a number of fixed reuse plans, to a mobile unit which involves determining a communication data service being requested by the mobile unit; selecting a base station that is capable of processing the requested communication data service; determining a mobile unit type; determining a minimum required link quality for the mobile unit; selecting one of a plurality of fixed reuse plans, ... wherein the selected reuse plan assures at least said minimum required link quality; ..." and does not teach or suggest the element of "the receiving step and the matching step are completed on-board" as claimed in claim 26 and "splitting the available resources to define the plurality of supplementary channels" as claimed in claim 27, in the context of claim 25 from which claims 26 and 27 depend.

Claims 28, 30, 34 and 40

As discussed above, Haartsen discusses at column 6, lines 10-45, the selection of base station, base station transceiver, and corresponding channel based on mobile unit type and base station receiver detection capabilities for providing different bit rate services. (column 6, lines 13-19). Haartsen does not teach or suggest "the step of defining capacity and direction of operation of the plurality of supplementary channels" as claimed in claim 28; "additional bandwidth is for traffic selected from a group of data traffic, voice traffic and a combination thereof" as claimed in claim 34; and especially, "the request is resulted from a data-burst" as claimed in claim 30, in the context of claim 25 from which claims 26 and 27 depend.

Claims 29, 33, and 41

Haartsen teaches at column 8, lines 59 to 63 a network database tracking "the capabilities of each base station, and the availability of each channel associated with each base station and reuse plan." Applicant notes that the network database of Haartsen is quite different than the base station database clamed in claims 35 and 41, and does not teach or suggest the class, location, and status of the plurality of supplementary channels as claimed in claim 29 and 33.

Applicant respectfully requests reconsideration and withdrawal of 35 USC 102 (b) rejection in view of the above comments.

35 USC 102 (b) Rejections

The Examiner has rejected claims 31 and 42 under 35 USC 103 (a) as being unpatentable by Haartsen in view of US Patent 5,734,697 by Jabbarnezhad, hereinafter referred to as Jabbarnezhad.

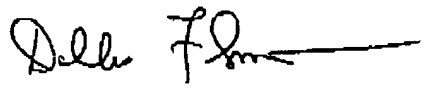
Applicant respectfully traverses the Examiner's rejections.

As discussed above, Haartsen does not teach or suggest the present claimed invention. Jabbarnezhad offers nothing to overcome the basic deficiencies of Haartsen. The Resource Allocation Command in Jabbarnezhad is a command used in a Resource Allocation database. It is different than the Resource Allocation Command sent of CEM of the present invention.

The additional functionality disclosed in Jabbarnezhad is therefore of no relevance, since both references deal with different subject matter than the present application.

Applicant respectfully requests reconsideration and withdrawal of this.

Respectfully Submitted,



Dallas F. Smith
Registration No. 34,074

c/o GOWLING LAFLEUR HENDERSON LLP
160 Elgin Street, Suite 2600
Ottawa, Ontario
K1P 1C3
CANADA

Telephone: (613) 233-1781
Facsimile: (613) 563-9869